

**USSC - Gary Works v1.1**  
**New Source Review Permit History**  
**089 -00121 (Source ID)**  
**T089-7663-00121 (Part 70 Operating Permit ID)**

<b>PERMIT ID Issue Date</b>	<b>FACILITY - COMMENT</b>
31581 6/5/12	
31136 11/14/11	
30801 8/18/11	
30266 7/26/11	
29913 2/4/11	
29907 11/19/10	
29607 8/15/11	
29236 8/24/10	
28848 8/4/10	
28635 1/14/10	
27690 10/5/09	
27151 1/12/09	
26519 2/17/09	Clean Air Interstate Nitrogen Oxides Ozone Season Trading Program
26246 4/24/08	USSC taking over Gary Coal Processing - Administrative Amendment; Brandenburg Industrial Service Company and USSC are no longer considered part of the same major source; AKJ Industries has taken over for Koppers, Inc. at the coke plant.
26215 3/26/08	Combined w/26246
25923 2/25/08	Levy Indiana Slag Company permit to be moved to USSC's permit for the No.13 Blast Furnace slag granulation plant
23680 10/22/07	Changes to Part 70 permit appealed conditions and new SO2 limit for No.5 Coke Battery underfire stack
23493 2/12/07	Withdrawn

23434 9/21/06	Combined with permit 23493
21298 6/14/05	Combined with permit 20118
21232 6/14/05	Combined with permit 20118
20118I (letter I) 6/16/05	No.14 Blast Furnace <b>Interim</b> Significant Source Modification Petition.
19709 5/2/05	Reconfiguration of the 84" Hot Strip Mill four (4) reheat furnaces enabling the firing of coke oven gas
20118 10/20/05	<p>Reline of No.13 Blast Furnace, now called No.14</p> <p>(a) Replacement of the furnace refractory lining with new and thinner refractory brick.</p> <p>(b) Replacement of furnace shell.</p> <p>(c) Removal and replacement of the top charging system with a new “bell-less” charging system.</p> <p>(d) Placement of new copper staves in the mantle area of the furnace.</p> <p>(e) Installation of new copper cooling plates and a new bustle pipe.</p> <p>(f) Repair of the checker work brick in the stoves and various structural, mechanical, and electrical repairs.</p> <p>(g) Enlargement of the slag granulator and addition of a stack.</p> <p>(h) Changes to the casthouse and casthouse emissions control system to improve capture efficiency of hoods at the tap holes, iron troughs, and runners.</p> <p>(i) Removal and replacement of the existing system for cleaning blast furnace gas with a more efficient scrubbing system.</p> <p>Pursuant to the provisions of 326 IAC 2-7-10.5, a significant source modification is hereby approved as described in the attached Technical Support Document. All other existing conditions and requirements applicable to the No. 14 Blast Furnace (formerly No. 13 Blast Furnace) shall remain unchanged and in effect. The source may begin construction and operation of the No. 14 Blast Furnace when this significant source modification has been issued.</p>
19678 10/29/04	Construction of one NG fired boiler, and two NG and coke oven gas fired boilers, at the Coke Plant Boiler House. Each boiler rated at 235 million Btu per hour.
18862 5/27/04	Installation of controls at the Nos. 5 and 6 Electrolytic Tinning Lines
17041 6/23/04	Combined with permit 7663
16676 2/11/03	Experimental operation for the use of urca as a control for SO2 at the No.3 Sinter Plant
15694	Removing an NOx limit at the Electro galvanizing Line Package Boiler

8/21/02	(EGL-1)
16365 9/16/04	Determination that Section 112(j) does not apply (40 CFR 63.50 through 63.56) since 40 CFR 63, Subpart EEE was promulgated (affected source categories that burn hazardous waste)
15929 6/20/02	Application to construct a fume mitigation system at the No.1 BOP shop.
15358 3/22/02	Experimental operation to install a prototype fugitive emission mitigation system No.1 BOP shop.
15090 3/05/02	Combined with permit 14988
15121 3/14/02	Upgrade of the existing pushing control system which services coke batteries Nos. 5 and 7.
14988 7/19/02	Modification to CP 8606 establishing a new limit to the heat treat furnace of 279.2 million cubic feet per year.
14988 7/19/02	Changing the annual Natural Gas Consumption Limit of the LOI Pulse-Fired Plate Heat Treatment Furnace, 160/210 - inch plate mill from 140.5 MMSCF/yr to 279.2 MMSCF/yr.
14950 11/30/01	Administrative Amendment to permit 14658 adding a reporting form.
14692 12/17/01	Construction of Synthetic Fuel Plant, blending of coal and mixing of binding agent, not to exceed 500 tons per hour.
14649 8/23/01	Request to perform an experimental operation at the No.6 blast furnace to evaluate the effects of oxygen enrichment on combustion air.
14658 10/02/01	Installation of one active dust control system or baghouse on an existing lime storage silo at the Coke Plant Boiler House
14424 8/02/01	Upgrade to the existing Electro galvanizing Line Package Boiler (EGL-1)
12880 7/26/01	<p>The proposed changes involve the installation of three (3) fifty (50) MMBtu per hour low-NO<sub>x</sub>/flue gas recirculation burner systems (ISB001, ISB002, and ISB003) on the No. 1, No. 2, and No. 3 Sinter Strands which will use waste coke oven gas as the primary fuel and natural gas as a supplementary fuel. The purpose of the installation of these burners is to provide sufficient heat to sustain the chemical reactions necessary for efficient SO<sub>2</sub> removal by the existing dry venturi scrubber.</p> <p>The proposed changes also involve the installation of three (3) natural gas injection jets with capacities of 22 MMBtu per hour (CPNGI001), 43 MMBtu per hour (CPNGI002), and 122 MMBtu per hour (CPNGI003) on the coke oven battery system. These jets will inject natural gas into the coke oven battery underfire coke oven gas supply line as needed to help comply with the applicable SO<sub>2</sub> emission limit when the coke oven gas desulfurization plant is down for maintenance.</p>
12137 10/16/2000	The proposed changes to the boilers involve replacement in kind of the pilots, replacement in kind of the burners and replacement of the fans with larger ones. The forced draft fans, which provide combustion air to the boilers, and the induced draft fans, which extract products of combustion from the boilers,

	are not large enough to allow any of the boilers to fire 100% blast furnace gas (BFG). Because of this, supplementation with mixed gas and/or fuel oil is frequently required. Larger fans will allow BFG to be burned more efficiently, however, the larger fans will not result in increases in the maximum heat input rate capacity for BFG, mixed gas or fuel oil. To minimize risk of catastrophic failure and improve safety, US Steel will install two new computerized instrumentation and control systems on each boiler. Each boiler will have a combustion control system, which will continuously control the air fuel mixture which will provide improvement to the combustion process. A new burner management system, which will continuously monitor conditions within each boiler and interrupt fuel flow in the event of a problem, such as boiler flame out or failure in the feed water system.
11953 4/5/02	Administrative Amendment to 10551. A change in the method of operating an existing 400 ton per hour petroleum coke crusher located inside the existing coal blending building to operate as a second frozen coal breaker at a rate of 1200 tons per hour. The petroleum coke crusher is a totally enclosed hammer mill. A change in the method of operating an existing 400 ton per hour petroleum coke crusher located inside the existing coal blending building to operate as a second frozen coal breaker at a rate of 1200 tons per hour. The petroleum coke crusher is a totally enclosed hammer mill. Pursuant to the New Source Performance Standards (NSPS), Part 60.250 through 60.254, Subpart Y, "Standards of Performance for Coal Preparation Plants", visible emissions from the petroleum coke crusher while in service as a frozen coal breaker shall not exceed 20% opacity. The petroleum coke crusher in service as a coal crusher shall not discharge into the atmosphere particulate matter in excess of 0.07 gram per dry standard cubic meter (g/dscm) (0.03 grain per dry standard cubic foot (dscf).
11500 8/3/01	Grand Calumet River sediment Remediation Program
10551 2/10/99	No image available.
10160 1/3/00	Replace existing BFG burners in previously permitted TBBH boiler no. 6 with new, larger burners. This modification will increase the heat input capacity of the boiler from 560 to 710 million Btu per hour while combusting BFG, but heat input capacity will remain unchanged combusting natural gas. This modification will allow the boiler to increase the combustion of BFG while reducing the equivalent amount flared at the BFG flare stacks. The modification will also remove the ability of boiler no. 6 to utilize no. 6 fuel oil and COG. This boiler is not attached to any air pollution control devices and exhausts through an individual stack, identified as TBBH-6.
10037 8/26/98	Revoked. No facility process information available. Issued 08-26-1998.
10095 8/21/98	Revoked. No facility process information available. Issued 09-21-1998.

10037 8/26/98	Revoked. No facility process information available. Issued 08-26-1998.
9568 9/21/98	(a) allow Turboblower Boiler House (TBBH) boiler no. 4A to burn natural gas at the maximum heat input rate of 244 MMBtu/hr (b) allow Turboblower Boiler House (TBBH) boiler no. 4A to burn coke oven gas at 244 MMBtu/hr.
9409 3/31/98	Combined with permit 9568.
9035 11/12/97	Revoked. No facility process information available. Issued 10-07-1997.
8606 10/20/97	(a) hydrogen atmosphere batch annealing furnaces including three fixed burner bases and two movable heating hoods, with a total heat input capacity of 10.26 million British Thermal Units per hour; (b) one (1) plate mill heat treatment furnace with a maximum heat input capacity of 56.5 million British Thermal Units per hour.
8150 7/22/97	No image available. No facility process information available.
7663 8/18/06 <b>T5 permit</b>	Initial Title V Operating Permit issued to an iron and steel mill.
6226 8/16/96	Revoked. No facility process information available. Issued 08-16-1996.
6225 8/7/96	Revoked. No facility process information available. Issued 08-07-1996.
4495 1/23/97	Revoked. No facility process information available. Withdrawn 01-23-1997.
4325 2/24/95	Superseded. No facility process information available. Issued 02-24-1995.
3663 5/31/94	Superseded. No facility process information available. Issued 06-31-1994.
3494 1/23/97	Revoked. No facility process information available. Withdrawn 01-23-1997.
3279 1/10/94	Superseded. No facility process information available. Issued 01-10-1994.
2955 3/25/94	Superseded. No facility process information available. Denied 03-25-1994.
0001 4/22/94	Superseded. No facility process information available. Withdrawn 04-22-1994.
2105 1/23/97	Superseded. No facility process information available. Withdrawn 01-23-1997.
2800 1/23/97	Superseded. No facility process information available. Withdrawn 01-23-1997.